

Frequently Asked Questions

Why do I get this report each year?

Community water system operators are required by federal law to provide their customers with an annual water quality report. The report helps people make informed choices about the water they drink. It lets people know what contaminants are in their drinking water and how these contaminants may affect their health. It also gives the system operators a chance to tell customers what it takes to deliver safe drinking water.

Why does my water sometimes look “milky”?

The “milky” look is caused by tiny air bubbles in the water. The water in the pipes is under pressure, and gases (the air) are dissolved and trapped in the pressurized water as it flows into your glass. As the air bubbles rise in the glass, they break free at the surface, thus clearing up the water. Although the milky appearance might be disconcerting, the air bubbles won't affect the quality or taste of the water.

How can I keep my pet's water bowl germ free?

Veterinarians generally recommend that water bowls be washed daily with warm, soapy water—normally when you change the water. Scour the corners, nooks, and crannies of the water dish using a small scrub brush. In addition, once a week put water bowls into the dishwasher to sanitize them with hot water. In most situations, disinfectants like bleach are not needed; warm, soapy water is all you need to keep your pet's water clean and safe.

Is it okay to use hot water from the tap for cooking and drinking?

No, always use cold water. Hot water is more likely to contain rust, copper, and lead from household plumbing and water heaters. These substances can dissolve into hot water faster than they do into cold water, especially when the faucet has not been used for an extended period of time.

How many contaminants are regulated in drinking water?

The U.S. EPA regulates over 80 contaminants in drinking water. Some states may choose to regulate additional contaminants or to set stricter standards, but all states must have standards at least as stringent as the U.S. EPA's. The complete list can be viewed at <http://water.epa.gov/drink/contaminants/index.cfm>.

Should I be concerned about sodium in my drinking water?

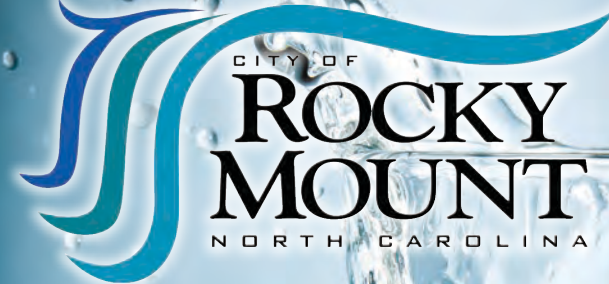
The USDA recommended daily allowance for sodium for a healthy adult is 2400 mg per day. Two liters (about 9 servings) of our tap water has 48 mg or about 2% of the RDA. The leading sources of sodium in a typical diet are bread-like foods.



For more information about your water

If you have any questions about this report or concerning your water, please contact James Connolly at 252-972-1336. We want our valued customers to be informed about their water utility.

If you want to learn more, please attend any regularly scheduled meeting of the City Council. Those meetings are held on the second and fourth Mondays of the month at 7:00 PM and 4:00 PM respectively. The location is the City Hall Council Chambers, 331 South Franklin Street, Rocky Mount, NC.



2013 Annual Drinking Water Quality Report

We are pleased to present to you this year's Annual Drinking Water Quality Report. This report is a snapshot of last year's water quality. Included are details about your source(s) of water, what it contains, and how it compares to standards set by regulatory agencies. Our constant goal is to provide you with a safe and dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and protect our water resources. We are committed to ensuring the quality of your water and to providing you with this information because informed customers are our best allies.

Our Drinking Water Is Regulated

This report is a summary of the quality of the water we provide our customers. The analysis covers January 1 through December 31, 2013. It was made by using the data from the most recent U.S. Environmental Protection Agency (EPA) required tests and is presented in the attached pages.

Where Do We Get Our Drinking Water?

The source of our water is the Tar River. We treat the water at either of two water treatment facilities before it is introduced into the water distribution system. One facility is located at the Tar River Reservoir, and the other is located on Sunset Avenue across from City Lake. In 2013, we treated and distributed 3,335 million gallons of water to customers in the City of Rocky Mount and surrounding communities. To learn more about our watershed, go to U.S. EPA Surf Your Watershed Web page at www.epa.gov/surf.

Source Water Assessment

The North Carolina Department of Environment and Natural Resources (DENR) conducts a Source Water Assessment Program. The purpose of our assessment was to determine the susceptibility of the drinking water source to potential contamination. The assessment reported a susceptibility rating of higher for the Sunset Avenue treatment facility on the Tar River and a rating of moderate for the Tar River Reservoir treatment facility. These ratings do not imply poor water quality; rather, they signify the system's potential to become contaminated. The complete SWAP (Source Water Assessment Program) report for North Carolina water suppliers may be viewed at <http://swap.deh.enr.state.nc.us/swap>. If you have any questions about the assessment, please contact the Source Water Assessment staff at (919) 715-2633.

Sources of Drinking Water

The sources of drinking water (both tap water and bottled water)

include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally-occurring minerals and, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity.

Contaminants that may be present in source water include:

- Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- Inorganic contaminants, such as salts and metals, which can be naturally occurring or result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- Pesticides and herbicides, which may come from a variety of sources such as agriculture, urban stormwater runoff, and residential uses.
- Organic chemical contaminants, including synthetic and volatile organic chemicals, which are byproducts of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, and septic systems.
- Radioactive contaminants, which can be naturally-occurring or be the result of oil and gas production and mining activities.

All Drinking Water May Contain Contaminants

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk. In order to ensure that tap water is safe to drink, EPA prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. Food and Drug Administration regulations establish limits for contaminants in bottled water which must provide the same protection for public

health. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline (1-800-426-4791).

Lead and Drinking Water

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. The City of Rocky Mount is responsible for providing high quality drinking water but cannot control the variety of materials used in customer plumbing components. When your water has been sitting in the home piping for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before using water for drinking or cooking. If you are concerned about lead in your water, you may wish to have your water tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline or at www.epa.gov/safewater/lead.

Cryptosporidium Testing

The City of Rocky Mount tested for Cryptosporidium from 2006 to 2008. Testing consisted of 96 samples of more than 960 liters of source river water. We detected 5 cryptosporidium spores. The result of the testing is that our source water was classified as Bin 1. Bin 1 represents source water that is lowest risk of Cryptosporidium and Bin 4 represents highest risk.

Cryptosporidium is a microbiological pathogen found in surface water. Ingestion of Cryptosporidium may cause cryptosporidiosis, an abdominal infection. Some people may be more vulnerable to disease-causing microorganisms or pathogens in drinking water than the general population. Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, some elderly, and infants can be particularly at risk from infections. These people should seek advice from their health care provider about their drinking water.



2013 Test Results

We routinely monitor for constituents in your drinking water according to Federal and State laws. The test results table shows the results of our monitoring for the period of January 1st to December 31st, 2013. In the table you might find terms and abbreviations you are not familiar with. To help you better understand these terms we've provided the following definitions:

Definitions

- **Action Level (AL)** – the concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.
- **Action Level Goal (ALG)** – the level of a contaminant in drinking water below which there is no known or expected risk to health. ALGs allow for a margin of safety.
- **Average** – Regulatory compliance with some MCLs is based on running annual average of monthly samples.
- **Maximum Contaminant Level (MCL)** – the highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology. Secondary MCLs are unenforceable guidelines for aesthetic quality of water.
- **Maximum Contaminant Level Goal (MCLG)** – the level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.
- **Maximum Residual Disinfectant Level (MRDL)** – the highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.
- **Maximum Residual Disinfectant Level Goal (MRDLG)** – the level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.
- **mrem** – millirems per year (a measure of radiation absorbed by the body).
- **NA** – not applicable.
- **ND** – not detected.
- **TT** – treatment technique
- **NTU** – Nephelometric Turbidity Units.
- **Parts per billion (ppb)** – micrograms per liter (µg/L) or one ounce in 7,800,000 gallons of water.
- **Parts per million (ppm)** – milligrams per liter (mg/L) or one ounce in 7,800 gallons of water.
- **Picocuries per liter (pCi/L)** – a measure of the radioactivity in water.
- **Range** – lowest and highest measurements
- **SU** – standard unit

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, some elderly and infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. EPA/CDC guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline (1-800-426-4791).

Microbiological Contaminants

Contaminant	Violation Y/N	Your Water	MCLG	MCL	Likely Source of Contamination
Total Coliform Bacteria (presence or absence)	N	0.4%	0	5% of monthly samples are positive	Naturally present in the environment
Fecal Coliform or E. Coli	N	0	0	N/A	Human and animal fecal waste

Turbidity

Contaminant	Violation Y/N	Level Detected	Average	MCL (Allowable Level)	Major Sources in Drinking Water
NTU	N	0.04-0.29	0.19	TT=1 NTU	Soil runoff
NTU % samples <0.3	N	100%	N/A	N/A	

Turbidity is a measurement of the cloudiness of water. We monitor it because it is a good indicator of the effectiveness of our filtration system.

Inorganic Contaminants

Contaminant (Units)	Violation Y/N	Average	Range	MCLG	MCL	Major Sources in Drinking Water
Chromium (ppm)	N	<0.0002	ND-0.00025	0.1	0.1	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride (ppm)	N	0.4	ND-0.4	4	4	Erosion of natural deposits; water additive which promotes strong teeth
Nitrate [as N] (ppm)	N	0.2	0.17-0.23	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits

Unregulated Inorganic Contaminants

Contaminant (Units)	Violation Y/N	Sample Date	Your water	Range	Secondary MCL
Sulfate (mg/L)	N	2/13/13, 11/4/13	58.7	57.0-60.4	250

Unregulated VOC Contaminants

Contaminant (Units)	Violation Y/N	Sample Date	Your water	Range	Likely Source of Contamination
Chloroform (ppb)	N	Feb.-Nov. 2013	40	13-82	By-products of drinking water disinfection
Bromodichloromethane (ppb)	N	Feb.-Nov. 2013	9	2-14	By-products of drinking water disinfection
Chlorodibromomethane (ppb)	N	Feb.-Nov. 2013	2	1-3	By-products of drinking water disinfection

Lead and Copper							
Contaminant (Units)	Violation Y/N	Date Sampled	Your Water	# of sites above the AL	MCLG	MCL	Likely Source of Contamination
Copper (ppm) at 90th percentile	N	Aug.-Sept. 2011	0.061	0	1.3	AL= 1.3ppm	Erosion of natural deposits; leaching from wood preservatives; corrosion of household plumbing systems
Lead (ppb) at 90th percentile	N	Aug.-Sept. 2011	<3	1	0	AL= 15ppb	Corrosion of household plumbing systems; erosion of natural deposits

Radioactive Contaminants							
Contaminant (Units)	Violation Y/N	Sample Date	Your water	Range	MCLG	MCL	Likely Source of Contamination
Alpha Emitters (pCi/L)	N	2013	1.97	ND-3.94	0	15	Erosion of natural deposits of certain minerals that are radioactive and may emit a form of radiation known as alpha radiation
Beta Photon Emitters (mrem)	N	2013	2.45	ND-4.89	0	4	Decay of natural and man-made deposits of certain materials that are radioactive and may emit forms of radiation known as photons and beta radiation
Combined Radium (pCi/L)	N	2013	0.14	ND-0.27	0	5	Erosion of natural deposits

Total Organic Carbon (TOC)							
Contaminant	TT Violation Y/N	Your Water RAA Removal Ratio	Range of Monthly Removal Ratios	MCLG	MCL	Compliance Method	Likely Source of Contamination
Total Organic Carbon	N	1.52	1.38-1.62	N/A	TT	Step 1	Naturally present in the environment
Depending on the TOC in our source water, the system must have a certain percent removal of TOC or must achieve alternative compliance criteria. If we do not achieve that percent removal, there is an alternative percent removal. If we fail to meet the alternative percent removal, we are in violation of a Treatment Technique.							

Disinfectants and Disinfection By-products						
Contaminant (Units)	Violation Y/N	Average	Range	MCLG	MCL	Likely Source of Contamination
Total Trihalomethanes (TTHM) (ppb)	N	49	23-97	N/A	80	By-product of drinking water chlorination
Haloacetic Acids (HAA5) (ppb)	N	23	0-57	N/A	60	By-product of drinking water chlorination
Chloramines (ppm)	N	2.9	0.4-3.9	4	4	Water additive used to control microbes
Chlorine (ppm)	N	1.96	0-3.7	4	4	Water additive used to control microbes

Water Characteristic Contaminants					
Contaminant (Units)	Sample Date	Average	Range	Secondary MCL	Noticeable Effects And/Or Likely Source of Contamination
Iron (ppm)	2/13/13, 11/4/13	0.03	ND-0.06	0.3	Rusty color; sediment; metallic taste; reddish or orange staining
pH (SU)	2/13/13, 11/4/13	N/A	7.6-8.1	6.5-8.5	Low pH: bitter metallic taste; corrosion/high pH: slippery feel; soda taste; deposits
Sodium (ppm)	2/13/13, 11/4/13	24	17-31	NA	Sodium refers to the salt present in the water and is generally naturally occurring.
Hardness (mg/L)	N/A	45	20-76	NA	Hardness is the sum of polyvalent cations present in the water, generally magnesium (Mg+2) and calcium (Ca+2). The cations are usually naturally occurring.

Secondary Drinking Water Regulations are non-enforceable guidelines regarding contaminants that may cause cosmetic effects (such as skin or tooth discoloration) or aesthetic effects (such as taste, odor, or color) in drinking water.

Unregulated Contaminant Monitoring Rule (UCMR3)			
Contaminant (Units)	Year Sampled	Highest Detected	Range
Chromium (ppm)	2013	0.00027	0.00021-0.00027
Strontium (ppm)	2013	0.119	0.0482-0.119
Vanadium (ppm)	2013	0.00033	ND-0.00033
Chromium, Hexavalent (ppm)	2013	0.000074	0.000048-0.000074
Chlorate (ppm)	2013	0.5989	0.0492-0.5989

Unregulated contaminants are those for which EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulation is warranted. Any unregulated contaminants detected are reported in this table. For additional information and data visit <http://www.epa.gov/safewater/ucmr/ucmr2/index.html> or call the Safe Drinking Water Hotline at (800) 426-4791.